# DATA SHEET

Brocade 300 8 Gb Fibre Channel switch Up to 24 ports

The Brocade<sup>®</sup> 300 is an 8 Gbit/s Fibre Channel switch and provides the flexible building blocks customers need for high performance easily manageable storage area networks in large or fast growing server and virtual server environments. With a flexible architecture that supports 1, 2, 4 and 8 Gbit/s technology with 8, 16, or 24 ports, the Brocade 300 provides a highly available, lossless networking between application and data as well as between server and storage networks.

#### Small SAN Affordability with Growth Capabilities

As the value and volume of business data continue to rise, organizations need technology solutions that are easy to implement and manage, and that can grow and change with minimal disruption. The Brocade<sup>®</sup> 300 Switch provides small to medium-sized enterprises with SAN connectivity that simplifies their IT management infrastructures, improves system performance, maximizes the value of virtual server deployments, and reduces overall storage costs.

The 8 Gbit/s Fibre Channel Brocade 300 provides a simple, affordable, single-switch solution for both new and existing SANs. To simplify deployment, the Brocade 300 features the EZSwitchSetup wizard and other usability and configuration enhancements, as well as the optional Brocade Access Gateway mode of operation. Moreover, it provides state-ofthe-art performance and Ports On Demand scalability to support SAN expansion and enable long-term investment protection.

## INCREASED EFFICIENCY TO MANAGE BUSINESS GROWTH

The Brocade 300 significantly increases performance and functionality for SANs at an entry-level price. Based on sixth-generation Brocade technology, the Brocade 300 combines auto-sensing 1, 2, 4, and 8 Gbit/s throughput with features that greatly enhance fabric operation. The evolutionary design provides these capabilities while consuming less than 2.5 watts of power per port for exceptional power and cooling efficiency.

As a result, organizations can enjoy the advantages of lowcost device connectivity and powerful capabilities that make SAN technology highly accessible and affordable. In addition, hot code load and activation helps maximize application uptime with faster system software upgrades and maintenance to reduce the dependency on scheduled outages.

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#### PAY-AS-YOU-GROW SCALABILITY

The Brocade 300 integrates innovative hardware and software features that make it easy to deploy, manage, and integrate into a wide range of IT environments. With powerful yet flexible capabilities—such as Ports On Demand scalability from 8 to 16 or 24 ports in 8-port increments—the Brocade 300 enables organizations to start small and grow their storage networks in a non-disruptive manner. In addition, organizations can initially deploy 4 Gbit/s SFPs and upgrade to 8 Gbit/s SFPs when necessary.

#### **BROCADE ACCESS GATEWAY MODE**

The Brocade 300 Fibre Channel switch supports Access Gateway mode which reduces traditional heterogeneous switch-to-switch interoperability challenges, utilising N\_Port ID Virtualization (NPIV) standards to present Fibre Channel server connections as logical devices to SAN fabrics. Attaching through NPIV-enabled switches and directors, the Brocade 300 in Access Gateway mode can connect to Brocade, McDATA, Cisco, or other SAN fabrics.



#### Main features

#### Benefits

Flexible ports on demand

- "Pay-as-you-grow" scalability
- The delivered 8 ports can easily upgrade to 16 or 24 by activating the port license

### TECHNICAL DETAILS BROCADE 300

Systems Architecture	
Fibre Channel ports	24 ports, universal (E, F, and FL)
Scalability	Full fabric architecture with 239 switches maximum
Certified maximum	56 switches, 7 hops; larger fabrics may be certified as required
Performance	1,2,4 and 8 Gbit/s line speed full duplex and auto-sensing of 1, 2, 4 and 8 Gbit/s port speeds; optionally programmable to fixed port speed; speed matching between 1, 2, 4 and 8 Gbit/s ports
ISL Trunking	Up to eight 8 Gbit/s ports per ISL trunk; up to 68 Gbit/s per ISL trunk
Aggregate bandwidth	408 Gbit/s end to end
Fabric latency	~700 nanoseconds, cut-through routing at 8 Gbit/s
Maximum frame size	2112-byte payload
Classes of service	Class 2, Class 3, Class F (inter-switch frames)
Port types	FL_Port, F_Port, E_Port, M-Port (Mirror Port); self-discovery based on switch type (U_Port)
Data traffic types	Fabric switches supporting unicast and broadcast
Media types	4Gbit/s: Hot-plug, Brocade Small Form-factor Pluggable (SFP), LCAnschluss; Short-Wavelength Laser (SWL) up to 500 Meter; Long-Wavelength Laser (LWL) up to 10 km; Extended Long-Wavelength Laser (ELWL) up to 30 km; Distance depends on fibre channel cable and port speed 8Gbit/s: Hot-plug, Brocade Small Form-factor Pluggable (SFP), LC-Connection Short-Wavelength Laser (SWL) up to 100 Meter; Long-Wavelength Laser (LWL) up to 10 km; Extended Long-Wavelength Laser (ELWL) up to 25 km
Fabric services	Simple Name Server, Registered State Change Notification (RSCN); Brocade Advanced Zoning, and Brocade Web Tools; optional fabric services include the Brocade Advanced ISL Trunking and Adaptive Networking
Management	
Management software supported	SSH,Telnet; HTTPS/SSL,RADIUS; SNMP v3 (FE MIB, FC Management MIB); Web Tools; Fabric Manager; EFCM Standard/Enterprise 9.x third-party applications utilizing the Brocade SMI Agent
Management access	10/100 Ethernet port (RJ-45); serial port (RJ-45); USB Port; In-band through Management Server
Diagnostics	POST and embedded online/offline diagnostics
Mechanicals	
Enclosure	Non-port side to port side (port side exhaust); back-to-front airflow; power from rear; 1.0U, 19-in. EIA- compliant
Size	Width: 42.88 cm Height: 4.29 cm Depth: 30.66 cm
System weight	4.2 kg - no SFP
Environmental	
Temperature	Operating: 0°C to 40°C Non-operating: -25°C to 70°C
Humidity	Operating: 10% to 85% non-condensing at 40°C Non-operating: 10% to 95%, non-condensing at 70° C
Altitude	Operating: up to 3000 meters Storage: up to 12 km

Shock	Operating: 20G, 6 ms half-sine Non-operating: 33G, 11 ms, Half sine
Vibration	Operating: 0.5 g sine, 0.4 grms random, 5 to 500 Hz Non-operating: 2.0 g sine, 1.1 grms random, 5 to 500 Hz
Airflow	Maximum airflow 23 CFM Nominal airflow 18 CFM
Power	
System power consumption	Nominal system draw 48 Watts max. 57 watts
Nominal input voltage	85 to 264 VAC, 47 to 63 Hz
Input line frequency	47 to 63 Hz
Input voltage	85 VAC minimum, 264 VAC maximum
BTU rating (80% efficiency)	277 BTU/hr
Inrush current	Maximum of 21,5 Amps for period between 10 to 150 ms at 50°C, hot or cold start
Safety	
The 300 complies with the following safety certifications:	UL 60950-1: 2003, First Edition (Underwriters Laboratories) CSA 60950-1-03 (Canadian Standards Association) Nemko EN60950:2000 TUV EN60950:2000 / IEC60950:1999 (TUV "GS" for Germany, TUV "S" for Argentina) GOST (Russia) Low Voltage Directive (73/23/EEC) for CE Marking in European Union

For more product information please go to http://www.fujitsu.com/eternus

Information about Fujitsu's environmental activities www.fujitsu.com/global/about/environment/



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